

**BEFORE**  
**THE PUBLIC SERVICE COMMISSION**  
**OF**  
**SOUTH CAROLINA**  
**DOCKET NO. 2020-43-E - ORDER NO. 2020-\_\_**

**April \_\_, 2020**

IN RE:

Application of Dominion Energy South	)	<b>JOINT PROPOSED</b>
Carolina, Incorporated for a Certificate of	)	<b>ORDER GRANTING A</b>
Environmental Compatibility and Public	)	<b>CERTIFICATE OF</b>
Convenience and Necessity for the	)	<b>ENVIRONMENTAL</b>
Construction and Operation of the Toolebeck	)	<b>COMPATIBILITY AND</b>
- Aiken 230 kV Tie and Segments of the	)	<b>PUBLIC CONVENIENCE</b>
Graniteville #2 - Toolebeck 230 kV and	)	<b>AND NECESSITY</b>
Toolebeck - South Augusta 230 kV Tie, and	)	
Associated Facilities	)	
_____	)	

**I. INTRODUCTION**

This matter comes before the Public Service Commission of South Carolina (the “Commission”) on the Application of Dominion Energy South Carolina, Inc. (“DESC” or the “Company”) for a Certificate of Environmental Compatibility and Public Convenience and Necessity (“Certificate”) for the construction and operation of the Toolebeck - Aiken 230 kilovolt (“kV”) Tie and Segments of the Graniteville #2 - Toolebeck 230 kV and Toolebeck - South Augusta 230 kV Tie, and Associated Facilities (collectively, the “Proposed Lines”) in Aiken County, South Carolina. DESC filed this application (the “Application”) on February 3, 2020, and contemporaneously served it on the South Carolina Office of Regulatory Staff (“ORS”) and the heads of each state and local governmental agency charged with the duty of protecting the

environment or of planning land use in the area in the county in which any portion of the facility will be located. At the request of the Company, the Commission established this docket pursuant to the provisions in S.C. Code Ann. § 58-33-10 *et seq.* (2015 & Supp. 2019) (the “Siting Act”) and S.C. Code Ann. Regs. 103-304 (2012).

A Notice of Filing and Hearing and Prefile Testimony Deadlines (“Notice”) regarding the Application was prepared and issued by the Clerk’s Office of the Commission (the “Clerk’s Office”). By letter dated February 10, 2020, the Clerk’s Office instructed DESC to publish the Notice in newspapers of general circulation in the affected areas one time on or before February 18, 2020, and to provide proof of such publication to the Commission by March 3, 2020. The Company complied with the instructions received from the Clerk’s Office on February 12, 2020, by timely publishing the Notice and thereafter filing an affidavit of publication on February 18, 2020, attesting to publication as directed by the Clerk’s Office.

The Notice established March 3, 2020, as the date by which interested parties or entities could timely file petitions to intervene or present their views in writing to the Commission. No petitions to intervene were filed with the Commission.

ORS is automatically a party to the certification proceeding in this Docket pursuant to S.C. Code Ann. §§ 58-4-10(B) (2015 & Supp. 2019) and 58-33-140(1)(b) (2015). The South Carolina Department of Health and Environmental Control (“SCDHEC”), South Carolina Department of Natural Resources (“SCDNR”), and South Carolina Department of Parks, Recreation and Tourism (“SCPRT”) (collectively, “Other Parties of Record”) are also automatically a party to the certification proceeding in this Docket based on the provisions of S.C. Code Ann. § 58-33-140. The Commission is informed that the ORS contacted the Other Parties of Record about the Application and also provided them with a copy of the Stipulation to review.

On March 3, 2020, DESC filed the Direct Testimony and Exhibits of R. Scott Parker and Nathan V. Bass. On March 17, 2020, ORS filed the Direct Testimony of Brandon S. Bickley. No other parties filed testimony in this Docket.

On March 27, 2020, ORS filed a Stipulation between it and DESC in this matter. The Stipulation primarily set forth that:

1. ORS will recommend that the Commission approve DESC's Application and grant DESC a Certificate for the Toolebeck - Aiken 230 kV Tie and Segments of the Graniteville #2 - Toolebeck 230 kV and Toolebeck - South Augusta 230 kV Tie, and Associated Facilities, as requested in the Application;
2. DESC agrees to notify ORS and the Commission once all necessary rights-of-way of the affected landowners are secured and provide proof that such rights have been obtained;
3. DESC agrees to follow all South Carolina, Commission, and local government regulations and laws arising from matters set forth in the Application; and
4. DESC will notify ORS and the Commission when the facilities begin commercial operation and of any changes to the planned commercial operation dates.

On March 27, 2020, ORS filed a Joint Motion from DESC and ORS for Expedited Review and Disposition without a Hearing (“Joint Motion”), requesting that the Commission accept the verified testimony of the DESC and ORS witnesses and grant the relief sought by the Company without a hearing. The Joint Motion was made in light of the scheduling challenges presented by the social distancing measures enacted by the State of South Carolina in response to the 2019 Novel Coronavirus, the desire for DESC to begin purchasing materials for construction, and the absence of any opposition to the Application or any issue in controversy.

Attached to the Joint Motion were the verifications of the testimony of DESC witness R. Scott Parker, Manager of Transmission Planning for DESC; DESC witness Nathan V. Bass, PLA, Manager of the Facilities Planning and Siting Division of Pike Engineering, LLC, a subsidiary of Pike Corporation; and ORS witness Brandon S. Bickley, a Regulatory Analyst in the Energy Operations Department of ORS.

The Commission denied the Joint Motion and held that the public hearing would go forward in a limited capacity with the parties and commissioners appearing virtually.<sup>1</sup> The hearing convened on April 14, 2020, with DESC represented by K. Chad Burgess, Esquire and Matthew W. Gissendanner, Esquire. Jackie Dickman, Esquire appeared on behalf of DHEC, and ORS was represented by Andrew M. Bateman, Esquire and Jenny R. Pittman, Esquire. The parties moved the verified prefiled Direct Testimonies and Exhibits of their witnesses into the record, along with the Stipulation.<sup>2</sup>

For the reasons set forth below, the Commission approves the Stipulation and grants the relief requested by DESC in the Application.

## **II. STATUTORY STANDARDS**

The Siting Act requires that before constructing and operating new electric transmission lines and associated facilities with a designed operating voltage in excess of 125 kV the owner obtain a Certificate from the Commission, provided, however, that the replacement of an existing facility with a like facility, as determined by the Commission, does not require a Certificate. S.C. Code Ann. § 58-33-110(1). In issuing such a Certificate, the Commission is required to make six findings. Those findings concern:

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<sup>1</sup> See Order No. 2020-299.

<sup>2</sup> DESC and ORS were the only parties to file testimony in this Docket.

1. The basis of the need for the facility. S.C. Code Ann. § 58-33-160(1)(a);
2. The nature of the probable environmental impact of the facility. S.C. Code Ann. § 58-33-160(1)(b);
3. Whether the impact of the facility upon the environment is justified, considering the state of available technology and the nature and economics of the various alternatives and other pertinent considerations. S.C. Code Ann. § 58-33-160(1)(c);
4. Whether the facilities will serve the interests of system economy and reliability. S.C. Code Ann. § 58-33-160(1)(d);
5. Whether there is reasonable assurance that the proposed facility will conform to applicable state and local laws and regulations issued thereunder, including any allowable variance provisions therein, except that the Commission may refuse to apply any local law or local regulation that is unreasonably restrictive. S.C. Code Ann. § 58-33-160(1)(e); and
6. Whether public convenience and necessity require the construction of the facility. S.C. Code Ann. § 58-33-160(1)(f).

The Commission has considered each of these statutory standards in light of the evidence on the record in this proceeding. On that basis, the Commission makes findings as set forth below:

### **III. FACTS AND LEGAL DETERMINATIONS**

#### **A. The Need for the Facilities, System Economy and Reliability, and Public Convenience and Necessity**

The Company adheres to the North American Electric Reliability Corporation (“NERC”) Transmission Planning Standards, as well as its own Long-Range Planning Criteria, in determining the need for new transmission facilities. According to DESC witness Parker, the DESC

Transmission System is designed in accordance with these standards and criteria so that nothing more serious than local load impacts will occur during certain contingencies and so that after appropriate switching and re-dispatching, all non-radial loads can be served with reasonable voltages, and all facilities can again operate within acceptable operating limits. A sample of contingencies considered includes:

1. Loss of any generator;
2. Loss of any transmission circuit operating at a voltage level of 115 kV or above;
3. Loss of any transmission transformer;
4. Loss of any electrical bus and associated facilities operating at a voltage level of 115 kV or above;
5. Loss of all 115 kV or above circuits on a common structure;
6. Loss of entire generating capacity in any one generating plant;
7. Loss of any generating unit simultaneously with the loss of a single transmission line;
8. Loss of all components associated with a transmission circuit breaker failure; and
9. Loss of any generator, transmission circuit, or transmission transformer, followed by manual system adjustments, followed by the loss of another generator, transmission circuit, or transmission transformer.

As indicated in the Application and in the testimony of DESC witness Parker, DESC's Transmission Planning studies have identified possible future contingency occurrences in the Aiken County area of its service area that would constitute violations of both NERC Transmission Planning Standards and DESC's Long-Range Planning Criteria.

DESC witness Parker testified that after studying multiple options within DESC, with the South Carolina Public Service Authority ("Santee Cooper"), and with Southern Company to decrease the power flow on these Aiken area lines, DESC and Santee Cooper have agreed to

establish the Toolebeck - Aiken 230 kV Tie and another 115 kV tie line. DESC witness Parker testified the Toolebeck - Aiken 230 kV Tie provides a significant path for power to flow out of the congested Aiken area and alleviate loading on the existing Aiken area 115 kV lines currently built with low ampacity conductor and with structures nearing their end-of-life. In addition to construction of the Toolebeck - Aiken 230 kV Tie, DESC witness Parker testified this solution involves expanding the existing Toolebeck Switching Station to add 230 kV capability and folding the Graniteville #2 - South Augusta 230 kV Tie into the upgraded and renamed Toolebeck Transmission Substation. Per DESC witness Parker, not only will the new tie line decrease the power flow on the existing Aiken area electrical transmission outlet lines and more reliably and evenly distribute the flow of power into and around the DESC system, but the new tie line will also increase the transfer capacity for DESC's electrical transmission system to all interconnected utilities.

DESC witness Parker testified that the Company considered five alternatives to the present proposal to address the reliability concerns identified but that such alternatives were not feasible due to costs, the amount of stress constructing these alternatives would put on the operation of the DESC transmission system, and the timeline for completion.

Having considered the various alternatives, DESC decided to pursue the present proposal, which is relatively easy to construct, more cost effective than the alternatives, and can be completed in the timeframe required.

DESC witness Parker testified that the Toolebeck - Aiken 230 kV Tie is planned to run between DESC's existing Toolebeck Switching Station in Aiken County, South Carolina, and the Interconnection Point with Santee Cooper approximately 0.7 miles east of Santee Cooper's existing Aiken Substation in Aiken County, South Carolina, primarily along existing rights-of-way for

approximately 7.2 miles. The Toolebeck - Aiken 230 kV Tie will share single pole, double circuit (“SPDC”) structures with an existing 115 kV line. Both sides of the SPDC structures will be designed for 230 kV even though the existing 115 kV line will continue to operate at its existing voltage.

DESC witness Parker testified that the existing Graniteville #2 - South Augusta 230 kV Tie, which will connect the DESC and Southern Company electrical transmission systems, will be folded into the Toolebeck Switching Station in Aiken County. The fold-in will run along 10.5 miles of existing right-of-way and approximately 0.1 miles of new right-of-way on SPDC structures from the Urquhart Junction, which is located approximately ten miles southwest of Aiken and six miles east of the Savannah River, to the Toolebeck Switching Station. Once the fold-in of the Graniteville #2 - South Augusta 230 kV Tie is complete, the two lines created by the fold-in will be renamed the Graniteville #2 - Toolebeck 230 kV and Toolebeck - South Augusta 230 kV Tie.

DESC witness Parker testified associated facilities to be added to DESC's transmission system include the 230 kV portion of the Toolebeck Switching Station, i.e., a bus and three 230 kV line terminals and power circuit breakers. Upon completion of the upgrades, the Toolebeck Switching Station will be renamed the Toolebeck Transmission Substation.

DESC witness Parker concluded that the Proposed Lines and associated facilities are critical to the operational integrity of DESC’s electrical transmission system, are necessary to ensure that the Company’s system remains in compliance with NERC standards and its own Long-Range Planning Criteria, will improve power flow and prevent unacceptable thermal loading and System Operating Limit violations (as defined by NERC) on the transmission system in the southern region of DESC’s electric service territory, and represent the most cost-effective proposal



in light of system needs and constraints and the best long-term solution for the continued transmission of safe, reliable electric power to DESC's customers.

ORS witness Bickley testified that the Proposed Lines and associated facilities will result in minimal impact to the environment and will serve the interests of system economy and reliability. Further, witness Bickley testified that the Proposed Lines and associated facilities will support the Company in providing reliable electric service to its customers. ORS witness Bickley supported DESC witness Parker's conclusion that the Proposed Lines and associated facilities under review serve the interests of system economy and reliability and are supported by public convenience and necessity.

The Commission finds DESC witness Parker's testimony concerning the basis for the need for the Proposed Lines and the associated facilities, and the contribution to system economy and reliability they represent, as corroborated by ORS witness Bickley, to be credible. This evidence supports a finding by the Commission that the Proposed Lines and the associated facilities are needed, that they serve the interests of system economy and reliability, and that they are required by public convenience and necessity. Accordingly, the Commission finds that as to the Proposed Lines and associated facilities, the statutory standards of S.C. Code Ann. §§ 58-33-160(1)(a), (d), and (f) are fully met by the evidence of record here.

**B. The Nature and Justification of the Probable Environmental Impact of the Proposed Lines and the Associated Facilities**

The Siting Act also requires the Commission to evaluate the nature of the probable environmental impact from the Proposed Lines and the associated facilities and to determine whether the impact upon the environment is justified, considering the state of available technology and the nature and economics of the various alternatives and other pertinent considerations.

DESC plans to construct the Proposed Lines primarily within existing rights-of-way and is in the process of obtaining rights-of-way to any affected areas owned by other individuals. There is substantial evidence in the record supporting the environmental benefits of DESC's decision to build the Proposed Lines primarily on existing rights-of-way. As DESC witness Bass testified, use of existing rights-of-way for the majority of the Proposed Lines minimizes the amount of environmental, land use, cultural resource and aesthetic effects from the Proposed Lines.

This conclusion is substantiated by the Transmission Line Siting and Environmental Report for the Toolebeck – Aiken 230 kV Tie and Segments of the Graniteville #2 – Toolebeck 230 kV and Toolebeck – South Augusta 230 kV Tie and Associated Facilities, which DESC witness Bass presented as an exhibit to his testimony ("Environmental Report"). This Environmental Report was based on literature and record reviews and extensive field-work by biologists, botanists, cultural resource historians and others to ascertain the probable environmental impact of constructing and operating the Proposed Lines and the associated facilities along the selected routes. As detailed in the Environmental Report, biologists and botanists conducted field studies to ascertain whether the construction and operation of the Proposed Lines and the associated facilities were likely to have any adverse impact on any state or federally-listed rare, threatened or endangered plant or animal species. They determined that such species were not likely to be adversely affected by the Proposed Lines or the associated facilities. In addition, the biologists and botanists also conducted field studies to ascertain whether the construction and operation of the Proposed Lines and the associated facilities were likely to have any adverse impact on streams and wetlands. Approximately 12.2 acres of wetlands, 0.8 acres of open water, and 1,160 linear feet of stream channels are present within the Proposed Lines' right-of-way. DESC witness Bass testified that, because of the measures DESC takes to protect wetlands, stream buffer zones,

streams and open waters during transmission line construction, minimal, if any, short-term and no longer-term impacts to wetlands or streams will occur.

These facts were set forth in DESC witness Bass's testimony and the various studies that form part of the Environmental Report prepared for the Proposed Lines and the associated facilities. Based on these facts, DESC witness Bass testified that the construction and operation of the Proposed Lines and the associated facilities would not have any significant short- or long-term impacts on the environment.

As to cultural resources, DESC witness Bass testified that DESC engaged Brockington and Associates, Inc. ("Brockington") in September and October 2019 to conduct a cultural resource records review and windshield reconnaissance survey and a Phase I archaeological investigation. Brockington conducted background research to identify all previously recorded archaeological and architectural resources that reside within 1.25 miles of the Proposed Lines' route. Of the 31 previously recorded archaeological sites within 1.25 miles of the Proposed Lines' route, Brockington determined that none of them will be affected by construction of the Lines because none are located within the existing or new DESC right-of-way. Seventy-one previously recorded architectural resources were identified within 1.25 miles of the Proposed Lines' route during the background research.

DESC witness Bass testified that after completing the background research, Brockington conducted the Phase I archaeological investigation in September and October 2019 in the existing right-of-way within which the Proposed Lines will be located. The investigation included shovel test excavations at 30-meter intervals that led to the identification of one previously unrecorded archaeological resource, an isolated, historic artifact scatter, within the existing right-of-way of the Proposed Lines' route. According to Brockington, isolated finds are generally not eligible for the

National Register of Historic Places (“NHRP”), and the context of the isolated find within the Proposed Lines’ right-of-way do not support an argument for recommending it otherwise. Brockington’s field survey concluded that most of the project corridor had been disturbed by development with some areas situated in low-lying drainages with hydric soils. Therefore, Brockington determined that the project will have no adverse effects on archaeological resources in the existing or new right-of-way of the Proposed Lines. Brockington submitted the findings of the Phase 1 archaeological investigation to the State Historic Preservation Office (“SHPO”) in a report titled *Phase I Intensive Archaeological Resources Survey for the Toolebeck – Aiken 230 kV Tie and a Portion of the Graniteville #2 – Toolebeck 230 kV and Toolebeck – South Augusta 230 kV Tie and Associated Facilities* dated December 2019. DESC witness Bass testified the SHPO issued a letter on January 15, 2020, agreeing that Brockington’s cultural resources survey was sufficient and that no additional archaeological studies were necessary.

DESC witness Bass testified that, during the windshield reconnaissance survey conducted in September 2019, Brockington visited each of the 71 previously recorded architectural resources. Brockington determined that 18 of the documented resources no longer exist and that none of the remaining 53 previously recorded sites were located within the existing or proposed right-of-way in which the Proposed Lines are to be built. Of the 53 remaining sites, only six were determined to be eligible or potentially eligible for the NRHP. Brockington identified no previously unrecorded individual resources with sufficient architectural integrity to be considered eligible for listing in the NRHP. DESC witness Bass testified Brockington submitted a report, entitled *Literature Review and Reconnaissance of the Proposed Toolebeck – Aiken 230 kV Tie and Segments of the Graniteville #2 – Toolebeck 230 kV and Toolebeck – South Augusta 230 kV Tie and Associated Facilities*, to the SHPO on January 16, 2020.

With regard to visual impacts, DESC witness Bass testified that the Proposed Lines will have very low overall visual effects for several reasons - the main reason being that the Proposed Lines will be built within existing DESC right-of-way and therefore will not pose any significant visual modifications resulting from right-of-way clearing. According to DESC witness Bass, the Proposed Lines will share an existing DESC right-of-way, parallel, or be adjacent to existing DESC, Santee Cooper, or Central Electric Power Cooperative, Inc. transmission lines for the Lines' entire length and a significant portion of the Proposed Lines route will traverse undeveloped areas where existing trees on each side of the right-of-way will provide significant screening.

In his testimony, DESC witness Bass concluded that the impact of the Proposed Lines and the associated facilities upon the environment was justified considering the state of available technology and the nature and economics of the various alternatives. In reaching this conclusion, DESC witness Bass noted that DESC witness Parker testified that DESC had considered several alternatives to the Proposed Lines and associated facilities and determined that the proposed facilities were superior solutions for providing DESC's customers with long-term electric system reliability. DESC witness Bass also testified that any resulting environmental impacts were minimized by the Company's decision to construct the Proposed Lines primarily on existing rights-of-way.

ORS witness Bickley testified that ORS contacted SCDHEC, SCDNR, and SCPRT regarding the Proposed Lines and associated facilities to determine if they had any concerns or if any of the departments planned to file comments or testimony. ORS received responses from SCDNR and SCPRT stating that they had no comments.

ORS witness Bickley also testified that ORS reviewed the Environmental Report and that, based on its review of the Environmental Report and its discussions with the other statutory parties,

ORS concluded that the Environmental Report adequately addressed the environmental impacts of the Proposed Lines.

The Commission finds that the evidence DESC and ORS presented through their witnesses Bass, Parker, and Bickley as to these matters is credible and persuasive. Based on the evidence of record, the Commission finds that the environmental impacts of the Proposed Lines and associated facilities have been appropriately evaluated, described and are not significant. These impacts are justified considering the state of available technology and the nature and economics of the various alternatives to the proposed siting of the Proposed Lines and the associated facilities. Accordingly, the Commission finds that as to the Proposed Lines and associated facilities, the statutory standards of S.C. Code Ann. §§ 58-33-160(1)(b) and (c) are fully met by the evidence of record here.

**C. Assurance that the Proposed Facilities Will Conform to  
Applicable State and Local Laws and Regulations**

The Siting Act requires the Commission to determine whether there is reasonable assurance that the proposed facilities will conform to applicable state and local laws and regulations issued thereunder. S.C. Code Ann. § 58-33-160(1)(e). DESC witness Parker testified unequivocally that the Proposed Lines and associated facilities will be constructed and operated in conformity with all applicable state and local regulations.

**D. Conclusion as to the Public Convenience and Necessity of the  
Proposed Lines and the Associated Facilities**

In conclusion, the Proposed Lines and associated facilities represent a feasible, appropriate and cost-effective means for maintaining system reliability and providing safe, reliable electric service to DESC's customers. For the reasons outlined herein, the Commission finds that the public convenience and necessity supports issuance of a Certificate for the construction and

operation of the Proposed Lines and the associated facilities as proposed. S.C. Code Ann. § 58-33-160(1)(f).

#### **IV. FINDINGS**

NOW THEREFORE, based upon the foregoing, IT IS HEREBY DECLARED AND ORDERED THAT:

1. DESC is hereby granted a Certificate of Environmental Compatibility and Public Convenience and Necessity for the construction and operation of the Toolebeck - Aiken 230 kV Tie and Segments of the Graniteville #2 - Toolebeck 230 kV and Toolebeck - South Augusta 230 kV Tie, and Associated Facilities, as requested in the Application.
2. DESC has shown the basis of the need for the Proposed Lines in that construction of the Proposed Lines is necessary to prevent unacceptable thermal loading and System Operating Limit violations (as defined by NERC) on the transmission system in the southern region of DESC's electric service territory upon the occurrence of certain contingencies and to ensure that DESC remains in compliance with applicable NERC Reliability Standards and DESC Long-Range Planning Criteria.
3. DESC has shown the nature of the probable environmental impact from construction and operation of the Proposed Lines and the associated facilities is not significant. Considering the state of available technology and the nature and economics of the various alternatives and other pertinent considerations, this impact is justified. By constructing the Proposed Lines within existing rights-of-way, DESC has selected the route for these Proposed Lines and associated facilities

in a way that appropriately minimizes environmental, land use, cultural resource, and aesthetic effects.

4. DESC has shown the Proposed Lines and associated facilities will serve the interests of system economy and reliability.
5. DESC will follow all applicable South Carolina, Commission, and local government regulations and laws arising from matters set forth in the Application.
6. The Stipulation between DESC and ORS is hereby approved by the Commission.
7. DESC will notify the Commission and ORS once all necessary rights-of-way of the affected landowners are secured and DESC will provide proof that such rights have been obtained.
8. DESC will notify the Commission and ORS when the facilities begin commercial operation and of any changes to the planned commercial operation dates.
9. Public convenience and necessity require the construction of the Proposed Lines and the associated facilities.
10. This Order shall remain in full force and effect until further order of the Commission.

BY ORDER OF THE COMMISSION:

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Comer H. (“Randy”) Randall, Chairman

ATTEST:



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Florence P. Belser, Interim Vice Chairperson

(SEAL)